

Listing of All Claims

1. (previously presented) A multimedia receiver system which provides drift compensation for a plurality of different satellite transponder signals or cable/broadcast signals (multimedia signals) received over a common low-noise block downconverter (LNB) comprising:

a system-level drift calculation logic to calculate an average drift amount among said multimedia signals in a first group of multimedia signals received over a common LNB; and

a system-level drift correction logic to correct drift of each of said first group of multimedia signals based on said average drift amount, wherein said system-level drift calculation logic comprises:

a carrier detection module to measure a carrier frequency of each of said first group of multimedia signals; and

an averager module to calculate said average drift amount difference between each of said measured carrier frequencies and corresponding desired carrier frequencies associated with said multimedia signals.

2. (previously presented) The system as in claim 1 further comprising:

a signal-level drift calculation logic to calculate a difference in drift between each individual multimedia signal and said average drift amount; and

a signal-level drift correction logic to correct drift for said each individual multimedia signal based on said difference.

3. (canceled)

4. (previously presented) The system as in claim 1 further comprising:
additional system-level drift calculation logic to calculate a second average drift amount for a second group of multimedia signals received over a second LNB; and
second system-level drift correction logic to correct drift of each of said multimedia signals in said second group by said second average drift amount.

5. (previously presented) The system as in claim 4 wherein the receiver system includes a front end having a plurality of tuners to provide said first group of multimedia signals, and said system-level drift correction logic comprises a phase-locked loop to perform a system-level frequency adjustment based on said average drift amount, by adjusting a center frequency of each of the tuners at the front end of the receiver.

6. (original) The system as in claim 1 wherein said system-level drift calculation logic comprises:

difference logic to calculate the difference between a desired frequency value and an actual frequency value for each individual multimedia stream; and
an averager to calculate the average difference between said desired frequency values and said actual frequency values.

7. (previously presented) The system as in claim 1 wherein said system-level drift correction logic comprises:

a phase locked loop (PLL) to perform a system-level frequency adjustment based on said average drift amount, said system-level frequency adjustment affecting each of said multimedia signals in said first group.

8. (previously presented) The system as in claim 6 wherein said system-level drift correction logic comprises: a phase locked loop (PLL) to perform a system-level frequency adjustment based on said average drift amount, said system-level frequency adjustment affecting each of said multimedia signals in said first group.

9. (original) The system as in claim 7 wherein said PLL is comprised of a divide-by-N module for precisely adjusting said system-level frequency responsive to said calculated average drift amount.

10. (original) The system as in claim 9 wherein said PLL further comprises: a sigma-delta A/D module for removing jitter from an output of said divide-by-N module.

11. (previously presented) The system as in claim 2 wherein said signal-level drift correction logic is comprised of a numerically controlled oscillator (NCO) to correct drift for each individual multimedia signal based on said difference.

12. (previously presented) An apparatus comprising:

a carrier analysis module to measure a signal characteristic of each of a plurality of satellite transponder signals or cable/broadcast signals (carrier signals) provided by a common LNB;

an averager module to calculate an average difference between each of said measured signal characteristics and respective desired signal characteristics; and

signal correction logic to adjust said signal characteristic for all of said carrier signals responsive to said calculated average difference,

wherein said signal characteristic is a measured frequency of each of said carrier signals and said desired signal characteristic is a specified frequency for each of said carrier signals.

13. (canceled)

14. (canceled)

15. (original) The apparatus as in claim 12 further comprising: individual carrier signal correction logic for correcting said signal characteristic for an individual signal carrier based on a difference between said signal characteristic for said signal carrier and said average difference.

16. (original) The apparatus as in claim 15 further comprising: individual carrier signal detection logic to measure said difference between said signal characteristic of each of said signal carriers and said average difference.

17. (canceled)

18. (canceled)

19. (original) The apparatus as in claim 14 wherein said PLL includes divide-by-N module for precisely adjusting said measured frequency of each of said carrier signals responsive to said calculated average difference transmitted from said averager unit.

20. (original) The apparatus as in claim 19 further comprising: a sigma-delta A/D module for removing jitter from an output of said divide-by-N module.

21-44 (cancelled).

45. (previously presented) An apparatus comprising:

a carrier analysis module to measure a signal characteristic of each of a plurality of satellite transponder signals or cable/broadcast signals (carrier signals) provided by a common LNB;

an averager module to calculate an average difference between each of said measured signal characteristics and respective desired signal characteristics; and

signal correction logic to adjust said signal characteristic for all of said carrier signals responsive to said calculated average difference, wherein said signal carriers are satellite transponder signals and wherein all of said signal carriers adjusted by said signal correction logic are from the same low noise block downconverter ("LNB").